Please enter the following claims:

41-47. (canceled)

48. (currently amended) A method of making a ~~non-human~~ transgenic female mouse ~~animal~~, comprising the steps of:

(a) providing a recombinant nucleic acid ~~according to claim 43~~ comprising;

i. a Tet operator response element;

ii. a nucleic acid encoding ovine FSHβ operatively associated with said Tet operator response element;

iii. an FSHβ promoter;

iv. an FSHβ locus control region operatively associated with said FSHβ promoter; and

v. a nucleic acid encoding a ligand-controllable receptor operatively associated with said FSHβ promoter, wherein said ligand-controllable receptor is a tetracycline-controllable transactivator fusion protein, and wherein tetracycline or an analog thereof acts as a ligand for said transactivator fusion protein; and

wherein said receptor binds to said Tet operator response element in the presence of said ligand when expressed in a host cell; and

(b) introducing said nucleic acid construct into a fertilized mouse ~~mammalian~~ oocyte;

(c) implanting said oocyte in a pseudopregnant female mouse ~~animal~~; and then

(d) raising said transgenic female mouse ~~animal~~ to viability from said oocyte in said host;

wherein said transgenic female mouse ~~animal~~ produces greater levels of FSHβ and greater numbers of oocytes ~~gametes~~ when administered said ligand than when not administered said ligand.

49-50. (canceled)

51. (original) The method of claim 48, wherein said introducing step is carried out by microinjection.

52. (original) The method of claim 48, wherein said nucleic acid comprises linear nucleic acid.

53-56. (canceled)

57. (currently amended) A method of enhancing the production of ~~gametes~~ oocytes in a transgenic mouse, ~~non-human animal,~~ comprising the steps of:

(a) providing a transgenic mouse of claim 48, and ~~non-human animal, said animal comprising cells that contain:~~

~~(i) a response element;~~

~~(ii) a nucleic acid encoding FSHβ operatively associated with said response element; [[.]]~~

~~(iii) an FSHβ promoter;~~

~~(iv) an FSHβ locus control region operatively associated with said FSHβ promoter; and~~

~~(v)~~ (v) a nucleic acid encoding a ligand-controllable receptor operatively associated with said FSHβ promoter, wherein said receptor binds to said response element in the presence of said ligand when expressed in a host cell;

(b) administering said ligand to said mouse ~~animal~~ in an amount effective to (i) stimulate the production of FSHβ in said mouse ~~animal~~ above that found in a corresponding untransformed animal; and (ii) stimulate the production of ~~gametes~~ oocytes in said mouse ~~animal~~ to a level greater than that found in the corresponding untransformed mouse ~~animal~~.

58-60. (canceled)

61. (currently amended) The method of claim 57 ~~60~~, further comprising the step of harvesting said oocytes from said animal.

62. (currently amended) The method of claim 57 ~~60~~, wherein said administering step is followed by the step of:

(c) mating said mouse ~~animal~~ to produce a litter of offspring therefrom, the size of said litter being greater than the size of a litter produced by the corresponding untransformed mouse ~~animal~~.

63. (currently amended) The method of claim 57, wherein said administering step is carried out by feeding said ligand to said mouse ~~animal~~.

64-70. (canceled)